



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/510,701	10/15/2004	Teruhiko Suzuki	260020US6PCT	9481
22850 7590 07/21/2010 OBLON, SPIVAK, MCCLELLAND MAIER & NEUSTADT, L.L.P. 1940 DUKE STREET ALEXANDRIA, VA 22314				
EXAMINER				
PE, GEEPY				
ART UNIT		PAPER NUMBER		
2621				
NOTIFICATION DATE		DELIVERY MODE		
07/21/2010		ELECTRONIC		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patentdocket@oblon.com
oblonpat@oblon.com
jgardner@oblon.com

Office Action Summary

Application No.

10/510,701

Applicant(s)

SUZUKI, TERUHIKO

Examiner

Geepy Pe

Art Unit

2621

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 14 May 2010.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 20-27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 20-27 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12 June 2009 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/GS/US)
Paper No(s)/Mail Date _____

- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to claims 20-27, as filed on 5/14/10, have been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
 2. Ascertaining the differences between the prior art and the claims at issue.
 3. Resolving the level of ordinary skill in the pertinent art.
 4. Considering objective evidence present in the application indicating obviousness or nonobviousness.
4. Claims **20, 21, 23, 26, and 27** are rejected under 35 U.S.C. 103(a) as being unpatentable over Tahara et al. (US Pat. 6,671,323; hereinafter Tahara; already of record).

Re. **claim 20**, Tahara teaches an encoding device, comprising: means for encoding an input image signal to generate a bitstream (Tahara: col. 1, lines 7-8; Figs. 1 & 2, element 2; Fig. 4; Fig. 28C); means for generating buffer characteristics information about buffering during decoding of the bitstream, wherein the buffer characteristics information includes an input bit

rate for a decoder buffer and a size of the decoder buffer for use during decoding of the bitstream, wherein the input bit rate and the size of the decoder buffer are used to determine whether the bitstream is decodable at a decoding device according to a combination between the input bit rate and the size of the decoder buffer (Tahara: Fig. 4; col. 6, lines 28-43; Fig. 11; col. 14, lines 5-8; Figs. 11 & 23; col. 13, line 52 - col. 14, line 24); and means for multiplexing the bitstream and the buffer characteristics information (Tahara: Fig. 4; col. 6, lines 28-43; col. 14, lines 5-8; Figs. 11 & 23; col. 13, line 52 - col. 14, line 24). Yet, Tahara does not explicitly teach determining whether the bitstream is decodable, using the combination of the input bit rate and the size of the decoder buffer. However, because Tahara uses the characteristics, to encode the bitstream, and because that is the inverse, the produced bitstream is, of course decodable, using the same characteristics as was used in encoding the bitstream. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to determine whether the bitstream is decodable, using the combination of the input bit rate and the size of the decoder buffer .

Re. **claim 21**, Tahara teaches that the combination between the input bit rate and the size of the decoder buffer is used as a determining criterion to determine whether the bitstream is decodable at the decoding device (Tahara: Fig. 4; col. 6, lines 28-43; col. 14, lines 5-8; Figs. 11 & 23; col. 13, line 52 - col. 14, line 24).

Re. **claim 23**, Tahara, now incorporating Ashikhmin, teaches that the buffer characteristics information contains a delay amount, and the input bit rate, the size of the decoder buffer, and the delay amount are used to determine whether the bitstream is decodable at the

decoding device (Tahara: Fig. 4; col. 6, lines 28-43; col. 14, lines 5-8; Figs. 11 & 23; col. 13, line 52 - col. 14, line 24).

Re. **claims 26 and 27**, the claim(s) recites analogous limitations to claim(s) 1 above, and is/are therefore rejected on the same premise.

5. Claims **22, 24, and 25** are rejected under 35 U.S.C. 103(a) as being unpatentable over Tahara as applied to claims **20, 21, 23, 26, and 27** above, and further in view of Ashikhmin et al. (U.S. Pat. 7,013,116; hereinafter Ashikhmin; already of record).

Re. **claim 22**, Tahara does not explicitly teach that the input bit rate and the size of the decoder buffer are used to generate a characteristics curve that is used to determine whether the bitstream is decodable at the decoding device. However, in the same field of endeavor, Ashikhmin teaches using a characteristic curve (in this case, using the characteristics of Tahara with the curve of Ashikhmin), where the characteristics are above another (Ashikhmin: col. 14, lines 16-34, 46-65; Fig. 5, 8) for the benefit of decreasing the bit error rate of the decoded signal (Ashikhmin: col. 2, lines 27-28). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made that the input bit rate and the size of the decoder buffer are used to generate a characteristics curve that is used to determine whether the bitstream is decodable at the decoding device in the Tahara invention, as shown in Ashikhmin, for the benefit of decreasing the bit error rate of the decoded signal. The Tahara invention, now incorporating the Ashikhmin invention, has all the limitations of claim 22.

Re. **claim 24**, Tahara, now incorporating Ashikhmin, teaches that the input bit rate, the size of the decoder buffer, and the delay amount are used to generate a characteristics curve that is used to determine whether the bitstream is decodable at the decoding device (Tahara: Fig. 4;

col. 6, lines 28-43; col. 14, lines 5-8; Figs. 11 & 23; col. 13, line 52 - col. 14, line 24 & Ashikhmin: col. 14, lines 16-34, 46-65; Fig. 5, 8).

Re. **claim 25**, Tahara, now incorporating Ashikhmin, teaches that the buffer characteristics information includes a minimum bit rate, a minimum decoder buffer size, and a minimum delay amount, which are used to generate a characteristic curve that is used to determine whether the bitstream is decodable at the decoding device (Tahara: Fig. 4; col. 6, lines 28-43; col. 14, lines 5-8; Figs. 11 & 23; col. 13, line 52 - col. 14, line 24 & Ashikhmin: col. 14, lines 16-34, 46-65; Fig. 5, 8).

Conclusion

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Geepy Pe whose telephone number is (571)-270-3703. The examiner can normally be reached on Monday - Friday, 7:00AM - 3:30PM (EST).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mehrdad Dastouri can be reached on 571-272-7418. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/G. P./
/Geepy Pe/
Examiner, Art Unit 2621

/Andy S. Rao/
Primary Examiner, Art Unit 2621
July 15, 2010